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January 26, 2006

Office of State Planning Coordination
540 S. DuPont Highway
Dover, DE 19901

Attention: Constance C. Holland, AICP

Subject: Blendt Farm – PLUS review – PLUS 2005-11-16
KCI Job No. 0203012BF

Ms. Holland,

As requested, we are providing this written response to those comments provided in your letter dated December 22, 2005 as a result of our meeting with State agency planners on November 22, 2005 to discuss the proposed plans for the Blendt Farm project. Please see the comments below for a detailed response to the comments provided by each agency present at the meeting.

Office of State Planning Coordination

The Delaware State University Farm (a.k.a. the Blendt Farm) is designated as “Out of Play” by the 2004 *Strategies for State Policies and Spending*. This designation is due to the fact that the property is protected and is not available for private development activities. The farm is in public ownership and is to remain in agricultural use by Delaware State University as a research farm. This project involves the construction of a structure to be used as an agricultural research facility. The proposed use is consistent with the intended use of this publicly owned property. Our office has no objections to the development of this project in accordance with relevant Town codes and ordinances.

KCI Response: Comment acknowledged; no response required.

Division of Historic and Cultural Affairs

The J. W. Hoffercker House (K-3940, on Beers Atlas of 1868) is within this parcel. The National Register-listed Ivy Dale Farm (K-127) is immediately across Smyrna-Leipsic Rd. from this parcel. There may be historic-period archaeological remains associated with the Hoffercker House, and there are areas of high to medium potential for prehistoric-period archaeological sites.

The DHCA is pleased to see that Delaware State University will be continuing the agricultural use of this land, thus maintaining the historic landscape in this area and protecting the visual setting of Ivy Dale Farm. However, the DHCA has found that the project is being funded by a federal grant administered by USDA from funds for landgrant schools. Because this particular project is an undertaking with the potential to affect historic properties, Delaware State University is required to comply with Section 106 of the National Historic Preservation Act of 1966 as amended. Unfortunately, the historic farmstead has already been demolished, although with some photographic documentation by the City of Smyrna. Further ground-disturbing activities may adversely affect archaeological resources.

The DHCA strongly urges Delaware State University to get in touch with them immediately, to begin the consultation process before any more work takes place here. The contact person here is Joan Larrivee, 302-736-7400.

KCI Response: *Delaware State University has requested funding assistance from USDA for a portion of the construction costs associated with this project. They are aware that that they will need to comply with Section 106 of the National Historic Preservation Act.*

Department of Transportation

1) Smyrna-Leipsic Road is classified as a major collector road. Collector road rights-of-way vary but are generally wider than those of local roads. DelDOT's policy is to require dedication of sufficient land to provide a minimum right-of-way width of 40 feet from the centerline on collector roads. Therefore DelDOT will require right-of-way dedication along the frontage to provide any additional width needed from this project.

2) DelDOT will also require that a 15-foot wide permanent easement, be provided across the frontage of the site for the future construction of a multi-use path.

3) The developer's site engineer should contact Mr. Brad Herb of Johnson, Mirmiran & Thompson (JMT), regarding our specific requirements for access. DelDOT has contracted with JMT for all subdivision and commercial entrance reviews in Kent County. Mr. Herb may be reached at (302) 266-9600.

KCI response: *The plan has been revised to provide for the dedication of right-of-way along the property frontage with Smyrna-Leipsic Rd. (A.K.A. Route 12) to increase the width from the centerline to 40' in accordance with DelDOT's minimum requirements for a collector road. An additional 15'-wide easement has been provided for a possible multi-use (pedestrian/bike) path. Plans for the site will be submitted to JMT for review.*

The Department of Natural Resources and Environmental Control

Soils

According to the Kent County soil survey Sassafras, Woodstown, and Johnston were mapped on subject parcel. Sassafras is a well-drained upland soil that has few limitations for development. Woodstown is a moderately well-drained soil of low-lying uplands that has moderate limitations for development. Johnston is a very poorly-drained wetland associated (hydric) floodplain soil that has severe limitations for development.

KCI response: *Comment acknowledged. The proposed site improvements are contained within areas classified in the Sassafras soils group.*

Wetlands

Statewide Wetland Mapping Project (SWMP) maps indicate the presence of palustrine wetlands along most of the eastern boundary of subject parcel. These wetlands provide water quality benefits, attenuate flooding and provide important habitat for plants and wildlife. Vegetated buffers of no less than 100 feet should be employed from the edge of the wetland complex. This parcel contains a sensitive headwater stream/wetlands associated with the greater Smyrna River watershed. Headwater streams are important for the protection of water quality and the maintenance/integrity of the ecological functions throughout the length of the stream, including the floodplain system and/or water bodies downstream. Headwater streams are also a major avenue for nutrient-laden stormwater and sediment runoff - their protection deserves the highest priority. In recognition of this concern, the Watershed Assessment Section strongly recommends that the applicant consider preserving this natural forested buffer in its entirety. Efforts to maximize or expand (beyond the recommended 100-foot minimum) the existing natural buffer width with native herbaceous and/or wood vegetation (where applicable), is strongly recommended.

KCI response: *Comment acknowledged. The proposed site improvements are located in the northwesterly portion of the site away from the palustrine wetlands along the easterly parcel boundary.*



There are no proposed impacts to these wetlands or disturbance to the existing buffer by the proposed site improvements.

Wetland Permitting Information

PLUS application materials indicate that wetlands have been delineated (presumably a field delineation). This delineation should be verified by the Army Corps of Engineers through the Jurisdictional Determination process. Please note that impacts to palustrine wetlands are regulated by the Army Corps of Engineers through Section 404 of the Clean Water Act. In situations where the applicant believes that the delineated wetlands on their parcel are nonjurisdictional isolated wetlands, the Corps must be contacted to make the final jurisdictional assessment. They can be reached by phone at 736-9763. In addition, individual 404 permits and certain Nationwide Permits from the Army Corps of Engineers also require 401 Water Quality Certification from the DNREC Wetland and Subaqueous Land Section and Coastal Zone Federal Consistency Certification from the DNREC Division of Soil and Water Conservation, Delaware Coastal Programs Section. Each of these certifications represents a separate permitting process. To find out more about permitting requirements, the applicant is encouraged to attend a Joint Permit Process Meeting. These meetings are held monthly and are attended by federal and state resource agencies responsible for wetland permitting. Contact Denise Rawding at (302) 739-9943 to schedule a meeting.

KCI response: A field delineation of the wetlands was performed on the site in the vicinity of the proposed site improvements by Vortex Environmental, Inc. in October 2005. The alignment of the sanitary sewer and water mains had been designed to eliminate any impacts to the wetlands that were identified within the envelope of the wetlands investigation. The wetlands report and delineation will be submitted to ACOE for a JD.

TMDLs

A Total Maximum Daily Load (TMDL) is the maximum level of pollution for which a water quality limited water body can assimilate without compromising use and recreational goals such as swimming, fishing, drinking water, and shell fish harvesting. Although TMDLs as a “pollution runoff mitigation strategy” to reduce nutrient loading have not yet been developed for the Smyrna River subwatershed to date, work is continuing on their development and they should be completed by December 2006. Therefore, until the specified TMDL reductions and pollution control strategies are adopted, it shall be incumbent upon the developer to employ best available technologies (BATs) and/or best management practices (BMPs) as “methodological mitigative strategies” to reduce degradative impacts that might be associated with this project. Reducing imperviousness and tree plantings are some examples of proactive mitigative strategies that will help reduce nutrient runoff and its likely impacts on the Smyrna River subwatershed’s water quality, while ensuring State compliance with imminent Federal TMDL nutrient-reduction regulatory requirements.

KCI response: Comment acknowledged. It is anticipated that green technology BMP’s will be employed on the site to address stormwater management requirements.

Water Supply

The information provided indicates that the Town of Smyrna will provide water to the proposed projects through a central public water system. Our files reflect that Town of Smyrna does not currently hold a certificate of public convenience and necessity (CPCN) to provide public water in these areas. They will need to file an application for a CPCN with the Public Service Commission, if they have not done so already. Information on CPCN requirements and applications can be obtained by contacting the Public Service Commission at 302-739-4247. Should dewatering points be needed during any phase of construction, a dewatering well construction permit must be obtained from the Water Supply Section prior to construction of the well points. In addition, a water allocation permit will be needed if the pumping rate will exceed 50,000 gallons per day at any time during operation. All well permit applications must be prepared and signed by licensed water well contractors, and only licensed well drillers may construct the wells. Please factor in the necessary time for processing the well permit applications into the construction



schedule. Dewatering well permit applications typically take approximately four weeks to process, which allows the necessary time for technical review and advertising. Should you have any questions concerning these comments, please contact Rick Rios at 302-739-9944.

KCI response: Comment acknowledged. We will contact the Town to discuss their need to expand their CPCN service area to include the subject parcel. Dewatering points are not anticipated to be required for the site improvements proposed at this time.

Sediment and Erosion Control/Stormwater Management

A detailed sediment and stormwater plan will be required prior to any land disturbing activity taking place on the site. The plan review and approval as well as construction inspection will be coordinated through DNREC Division of Soil and Water Conservation Sediment and Stormwater Program. Contact Elaine Webb with the Sediment and Stormwater Program at (302) 739-9921, for details regarding submittal requirements and fees.

A Notice of Intent (NOI) for Stormwater Discharges Associated with Construction Activity must be submitted to DNREC Division of Soil and Water Conservation along with the \$195 NOI fee prior to plan approval. Applying practices to mimic the pre development hydrology on the site, promote recharge, maximize the use of existing natural features on the site, and limit the reliance on structural stormwater components, such as maintaining open spaces, should be considered in the overall design of the project as a stormwater management technique. Green Technology BMPs must be given first consideration for stormwater quality management. Each stormwater management facility should have an adequate outlet for release of stormwater. It is strongly recommended that you contact the reviewing agency to schedule a preliminary meeting to discuss the sediment and erosion control and stormwater management components of the plan. The site topography, soils mapping, pre and post development runoff, and proposed method(s) and location(s) of stormwater management should be brought to the meeting for discussion.

KCI response: Erosion & Sediment Control Plans and Stormwater Management Plans will be submitted to DNREC for review and approval. The NOI will be submitted prior to construction activity. It is anticipated that green technology BMP's will be employed to meet the stormwater management requirements.

Drainage

The Drainage Program recommends buffers of trees, shrubs, grasses, and sedges along all drainage ditches and wetlands. Existing buffers could be enhanced or new buffers planted to obtain 50-foot buffers on each side of the drainage ditches. Protect buffers from livestock grazing. The Drainage Program requests a minimum 25-foot tree and shrub planting on buffers with the tallest trees planted on the south and west side of the drainage ditches to maximize shading. Trees and shrubs should be native species, spaced to allow for mechanized drainage maintenance at maturity. Tree and shrub planting in this manner will provide a shading effect promoting water quality while allowing future drainage maintenance. Do not plant trees closer than 5 feet of the top of the ditch to avoid future blockages from tree roots. The Drainage Program recommends planting the balance of the 50-foot buffer, as well as the ditch banks, with herbaceous vegetation to aid in the reduction of sediment and nutrients entering into Mill Creek. Grasses, forbs and sedges planted within these buffers should be native species, selected for their height, ease of maintenance, erosion control, and nutrient uptake capabilities.

KCI response: Comment acknowledged. The proposed site improvements will have a minimal impact to the existing drainage ditches and wetlands on the site. It is anticipated that green technology BMP's will be employed on site to meet the stormwater management requirements. The proposed plantings within these BMP's will be selected based upon the comments above. It is anticipated that "subdivision trees" will be installed within the site to meet Town requirements. Tree selection and placement will be made with consideration given to the above comments.



Floodplains

Portions of the proposed project are located within the 100-year floodplain. It is recommended that development be limited to those areas which are outside of the 100-year floodplain.

KCI response: No site improvements are proposed within the 100-year floodplain. The floodplain on the site is associated with the stream along the easterly parcel boundary. The proposed site improvements are located within the northwesterly portion of the site, well away from the stream area.

Forest Preservation

According to the PLUS application, a forested remnant(s) (7.6 acres) is still present on this parcel. The Watershed Assessment Section strongly recommends that the applicant preserve this forested remnant in its entirety, given the importance of forest cover preservation to the overall water and habitat quality at the watershed scale, and the fact that this forested remnant comprises a relatively small portion of this parcel's overall land area.

KCI response: The proposed site improvements will have no impact on the forested remnants. The existing forest is concentrated along the easterly parcel boundary, whereas the proposed site improvements are located within the northwesterly portion of the site.

Underground Storage Tanks

There is one inactive LUST site located near the proposed project:

Joe Malago, Inc., Facility # 1-000040, Project # K8908255

There is one active LUST site located near the proposed project:

Super Soda Center, Facility #1-000105, Project # K0005058 (Facility 1-000105 also has two inactive LUST cases, Project #s K9710158 and K0107060)

No environmental impact is expected from the above inactive/active LUST sites. However, should any underground storage tank or petroleum contaminated soil be discovered during construction, the Tank Management Branch must be notified as soon as possible. It is not anticipated that any construction specifications would be need to be changed due to petroleum contamination. However, should any unanticipated contamination be encountered and PVC pipe is being utilized, it will need to be changed to ductile steel with nitrile rubber gaskets in the contaminated areas.

KCI response: Comment acknowledged; no response required.

State Fire Marshal's Office

These comments are intended for informational use only and do not constitute any type of approval from the Delaware State Fire Marshal's Office. At the time of formal submittal, the applicant shall provide; completed application, fee, and three sets of plans depicting the following in accordance with the Delaware State Fire Prevention Regulation (DSFPR):

a. Fire Protection Water Requirements:

Water distribution system capable of delivering at least 1500 gpm for 2-hour duration, at 20-psi residual pressure is required. Fire hydrants with 800 feet spacing on centers.

Where a water distribution system is proposed for (Storage) sites, the infrastructure for fire protection water shall be provided, including the size of water mains for fire hydrants and sprinkler systems.



b. Fire Protection Features:

All structures over 10,000 Sq. Ft. aggregate will require automatic sprinkler protection installed.

Buildings greater than 10,000 sq.ft., 3-stories or more or over 35 feet, or classified as High Hazard, are required to meet fire lane marking requirements.

Show Fire Department Connection location (Must be within 300 feet of fire hydrant), and detail as shown in the DSFPR.

Show Fire Lanes and Sign Detail as shown in DSFPR

c. Accessibility

All premises which the fire department may be called upon to protect in case of fire, and which are not readily accessible from public roads, shall be provided with suitable gates and access roads, and fire lanes so that all buildings on the premises are accessible to fire apparatus. This means that the access road to the subdivision from Smyrna Leipsic Road must be constructed so fire department apparatus may negotiate it.

Fire department access shall be provided in such a manner so that fire apparatus will be able to locate within 100 ft. of the front door.

Any dead end road more than 300 feet in length shall be provided with a turn-around or cul-de-sac arranged such that fire apparatus will be able to turn around by making not more than one backing maneuver. The minimum paved radius of the cul-de-sac shall be 38 feet. The dimensions of the cul-de-sac or turn-around shall be shown on the final plans. Also, please be advised that parking is prohibited in the cul-de-sac or turn around.

The use of speed bumps or other methods of traffic speed reduction must be in accordance with Department of Transportation requirements.

The local Fire Chief, prior to any submission to our Agency, shall approve in writing the use of gates that limit fire department access into and out of the development or property.

d. Gas Piping and System Information:

Provide type of fuel proposed, and show locations of bulk containers on plan.

e. Required Notes:

Provide a note on the final plans submitted for review to read “ All fire lanes, fire hydrants, and fire department connections shall be marked in accordance with the Delaware State Fire Prevention Regulations”

Proposed Use

Alpha or Numerical Labels for each building/unit for sites with multiple buildings/units

Square footage of each structure (Total of all Floors)

National Fire Protection Association (NFPA) Construction Type

Maximum Height of Buildings (including number of stories)

Note indicating if building is to be sprinklered

Name of Water Provider

Letter from Water Provider approving the system layout

Provide Lock Box Note (as detailed in DSFPR) if Building is to be sprinklered

Provide Road Names, even for County Roads



Preliminary meetings with fire protection specialists are encouraged prior to formal submittal. Please call for appointment. Applications and brochures can be downloaded from our website: www.delawarestatefiremarshal.com, technical services link, plan review, applications or brochures.

KCI response: The site plan will be revised as needed to address the requirements of the State Fire Marshal's Office. All applicable notes will be added to a Fire Marshal type plan that will be submitted to the local Fire Chief for discussion and the State Fire Marshal's Office for approval.

Department of Agriculture

The Delaware Department of Agriculture and the Delaware Forest Service fully support Delaware state University's efforts to develop agricultural research facilities at the Blendt Farm. The proposed structure is agriculture related, and does not pose drastic changes to the existing agricultural activity of the property. This application will benefit and continue the viability of agriculture in the Blendt Farm. Again, the Delaware Department of Agriculture supports this application.

Right Tree for the Right Place

The Delaware Department of Agriculture Forest Service encourages the developer to use the "Right Tree for the Right Place" for any design considerations. This concept allows for the proper placement of trees to increase property values in upwards of 25% of appraised value and will reduce heating and cooling costs on average by 20 to 35 dollars per month. In addition, a landscape design that encompasses this approach will avoid future maintenance cost to the property owner and ensure a lasting forest resource.

Native Landscapes

The Delaware Department of Agriculture and the Delaware Forest Service encourages the developer to use native trees and shrubs to buffer the property from the adjacent landuse activities near this site. A properly designed forested buffer can create wildlife habitat corridors and improve air quality to the area by removing six to eight tons of carbon dioxide annually and will clean our rivers and creeks of storm-water run-off pollutants. To learn more about acceptable native trees and how to avoid plants considered invasive to our local landscapes, please contact the Delaware Department of Agriculture Plant Industry Section at (302) 698-4500.

Tree Mitigation

The Delaware Forest Service encourages the developer to implement a tree mitigation program to replace trees at a 1:1 ratio within the site and throughout the community. This will help to meet the community's forestry goals and objectives and reduce the environmental impacts to the surrounding natural resources. To learn more, please contact our offices at (302) 349-5754.

KCI response: Comment acknowledged. There is no disturbance to the existing trees on site anticipated by the proposed site improvements. It is anticipated that a landscape plan will be prepared to meet the requirements of the Town. Plant (tree) selection and location will give consideration to the above comments.

Public Service Commission

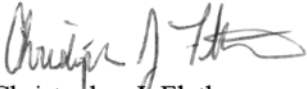
Any expansion of natural gas or installation of a closed propane system must fall within Pipeline Safety guidelines. Contact: Malak Michael at (302) 739-4247.

KCI response: Comment acknowledged. No natural gas facilities are included as part of the proposed site improvements.



Please call me at 731-9176 ext. 26 if you have any questions or comments regarding this matter.

Sincerely,
KCI TECHNOLOGIES, INC.



Christopher J. Flathers
Project Designer



Todd T. Frey, PE
Project Manager

cc: Brock Turner, Delaware State University
David Hugg, III, Town of Smyrna
Daryl Jester, Town of Smyrna
Sam Fletcher / Bill Evans, Town of Smyrna
Tim Shaver, Downes Associates
File (TF)
Corr.

